UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/791,552	03/02/2004	Paul DiCarlo	01194-461001	3274
26161 FISH & RICHA	7590 04/24/200 ARDSON PC	8	EXAMINER	
P.O. BOX 1022			GEORGE, KONATA M	
MINNEAPOLI	S, MN 55440-1022		ART UNIT	PAPER NUMBER
			1616	
			MAIL DATE	DELIVERY MODE
			04/24/2008	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary		Application No.	Applicant(s)				
		10/791,552	DICARLO ET AL.	DICARLO ET AL.			
		Examiner	Art Unit				
		KONATA M. GEORGE	1616				
Period fo	The MAILING DATE of this communication apport Reply	pears on the cover sheet with t	he correspondence ad	ddress			
WHIC - Exte after - If NC - Failu Any	ORTENED STATUTORY PERIOD FOR REPLICATION OF THE MAILING DISTRICT INTO THE MAILING DEPLY WILLIAM THE MAILING DEPLY WILLIAM THE MAILING DEPLY WILLIAM THE MAILING DEPLY WILLIAM THE MAILING THE MAILIN	ATE OF THIS COMMUNICAT 36(a). In no event, however, may a reply will apply and will expire SIX (6) MONTHS a, cause the application to become ABAND	TION. De timely filed from the mailing date of this of ONED (35 U.S.C. § 133).	·			
Status							
1) \	Responsive to communication(s) filed on <u>12 F</u>	ehruary 2008					
-		action is non-final.					
3)	, -						
٥/١	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Disposit	ion of Claims	•	,				
· _		n					
•	Claim(s) <u>37-77</u> is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration.						
	Claim(s) is/are allowed.	wir irom consideration.					
′=	· / ———	a vaia ata d					
-	Claim(s) <u>37,40,41,43,49,50,57,75 and 76</u> is/ar						
	Claim(s) <u>38,39,42,44,46,47,51-56,58-74 and 7</u>						
8)[_]	Claim(s) are subject to restriction and/o	r election requirement.					
Applicat	on Papers						
9)☐ The specification is objected to by the Examiner.							
10)🛛	The drawing(s) filed on February 25, 2005 is/a	re: a)∏ accepted or b)∏ obj	ected to by the Exam	niner.			
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
	Replacement drawing sheet(s) including the correct	tion is required if the drawing(s) is	s objected to. See 37 C	FR 1.121(d).			
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.							
Priority ι	ınder 35 U.S.C. § 119						
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some coll None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 							
2) Notice (3) Inform	t(s) se of References Cited (PTO-892) se of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO/SB/08) r No(s)/Mail Date	Paper No(s)/Ma	nary (PTO-413) nil Date nal Patent Application				

DETAILED ACTION

Claims 37-77 are pending in this application.

Action Summary

The examiner acknowledges the cancellation of claims 1-36. Therefore, any and all objections and/or rejections directed to them are hereby withdrawn.

The rejection of claims 37-41 under 35 U.S.C. 112, second paragraph, as being indefinite is hereby withdrawn in view of applicants' amendment to the claims.

The rejection of claims 37, 40 and 41 under 35 U.S.C. 102(b) as being anticipated by Morehouse, Jr. is maintained for the reasons stated in the office action dated September 25, 2007.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

⁽b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Application/Control Number: 10/791,552 Page 3

Art Unit: 1616

Claims 37, 40, 41, 43, 49, 50, 57, 75 and 76 are rejected under 35 U.S.C. 102(b) as being anticipated by Morehouse, Jr. et al (US 3,615,972).

Morehouse, Jr. et al disclose thermoplastic microspheres (abstract). Column 2, lines 1-11 teach that the particle comprises a shell defining an outer spherical surface and also containing an inner spherical surface. Column 38, lines 57-62 teach that the particles have a diameter below 50 microns. Figure 1 of Morehouse, Jr. teaches that a blowing agent can be incorporated into the particles (col. 2, lines 5-6). Column 4, lines 9-19 teach examples of the blowing agent as aliphatic hydrocarbons. The blowing agent Column 13, line 65 through column 14, line 3 teach that the particles can be incorporated in coatings, by mixing the beads in a suitable binder and wherein the binder is dissolved in a solvent. Since the polymers of the interior region and surface region of the particles of Morehouse, Jr. et al are different, the weight percent of the polymer in the interior would be inherently less than the polymer of the surface.

Response to Arguments

Applicant's arguments filed February 12, 2008 have been fully considered but they are not persuasive.

Applicant argues that Morehouse, Jr. does not disclose or suggest that the particles are in a carrier fluid. The examiner disagrees. Column 13, line 65 through column 14, line 3 of Morehouse, Jr. teach that the particles can be incorporated in coatings by mixing the beads in a suitable binder and wherein the binder is dissolved in

a solvent. It is the position of the examiner that the solvent will act as a carrier material for the coating compositions of which the particles will be employed.

Claim Objections

The numbering of claims is not in accordance with 37 CFR 1.126 which requires the original numbering of the claims to be preserved throughout the prosecution. When claims are canceled, the remaining claims must not be renumbered. When new claims are presented, they must be numbered consecutively beginning with the number next following the highest numbered claims previously presented (whether entered or not).

Misnumbered claims 47-78 been renumbered 49-77.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 45 and 48 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 45 and 48 recite the limitation "first polymer" in line 2. There is insufficient antecedent basis for this limitation in the claim.

Art Unit: 1616

Allowable Subject Matter

Claims 38, 39 and 42 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The prior art does not teach the carrier fluid comprising a saline solution, contrast agent or a surfactant. The prior art does not teach the interior region of at least 0.1 wt% and at most 50 wt% of the polymer.

Disposition of newly added claims (43-78)

Claims 44, 46, 47 and 51-74 and 77 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The prior art reference of Morehouse, Jr. does not teach the particle diameter as claimed in claims 52-53. Column 38, lines 57-62 teach that the particles have a diameter below 50 microns, whereas the particle of claim 52 is at least about 100 microns and at most 2,500 microns of claim 53. The prior art reference does not disclose the polymers as claimed in claims 55-64. The polymers of the prior art are acrylate or vinyl chloride-based and do not fall within the limitation of those described in the instant invention which are polyamides, polyalkylene oxide or polycarbonates. The prior art does not teach wherein the particles comprise a therapeutic agent as claimed in claims 65, 66, 69 and 70. The particles of the prior art are directed to the textile industry. The prior art does not teach an additional polymer added to the particles or a coating disposed on the surface of the

particles as claimed in claims 67, 68 and 71-74. The prior art also does not teach that the interior region of the particles comprising large pores as claimed in claim 77.

Conclusion

Claims 37, 40, 41, 43, 49, 50, 57, 75 and 76 are rejected.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, THIS ACTION IS MADE FINAL. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Telephone Inquiries

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Konata M. George, whose telephone number is 571Application/Control Number: 10/791,552 Page 7

Art Unit: 1616

272-0613. The examiner can normally be reached from 8:00AM to 6:30PM Monday to

Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Johann R. Richter, can be reached at 571-272-0646. The fax phone

numbers for the organization where this application or proceeding is assigned is 571-

273-8300.

Information regarding the status of an application may be obtained from the

Patent Application Information Retrieval (PAIR) system. Status information for

published applications may be obtained from either Private PAIR or Public PAIR.

Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

you have question on access to the Private Pair system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).

Konata M. George

Patent Examiner

Art Unit 1616

/Johann R. Richter/

Supervisory Patent Examiner, Art Unit 1616